

ABSTRACT OF THE DISCLOSURE

A control apparatus for controlling a regenerative operation of a vehicle motor includes a vehicle motor as a drive source of a vehicle, an energy storage device, including plural cells, for storing regenerative energy generated by a regenerative operation of the vehicle motor, and a total voltage measuring device for measuring a total voltage that is a sum of inter-terminal voltages of the plural cells, a cell voltage judgment device for determining whether the inter-terminal voltage of any one of the plural cells exceeds a predetermined regeneration limitation voltage, a total voltage estimating device for determining, when it is determined by the cell voltage judgment device that the inter-terminal voltage of any one of the cells exceeds the predetermined regeneration limitation voltage, an estimated total voltage which is defined as a total voltage at a time when the inter-terminal voltage of the one of the cells reaches a regeneration prohibition voltage that is higher than the predetermined regenerative operation limiting voltage, and a control device for setting an amount of regeneration depending on a difference between the estimated total voltage determined by the total voltage estimating device and the total voltage measured by the total voltage measuring device.